

# SemStats 2013

First international workshop on  
Semantic Statistics

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# Workshop goals

- Bring together two communities
  - Semantic Web people
  - Statisticians (esp. from official statistics)
- Learn from each other
  - Statisticians can learn how to publish their data as linked data
  - Semantic web people can learn how to better publish (structure, document...) their data
  - Learn together how to apply statistical method to linked data
- Clarify or discuss specific topics
  - Raw data, quality, confidentiality, provenance...
  - Semantic inference and statistical reasoning
  - Concept drift
- All will not be done during this workshop

# Agenda

- 9:00 AM - 10:30 AM - Morning Session 1
  - Keynote speech and 1 full paper
- 10:30 AM - 12:00 noon - Morning session 2
  - 3 full papers and 1 short paper
- 1:45 PM - 3:30 PM - Afternoon session 1
  - 3 full papers and 1 short paper
- 4:00 PM - 5:30 PM - Afternoon session 2
  - 1 full paper and 2 challenge papers
  - Awards, conclusions

# Organization

- Time for each presentation
  - Full papers: 20 minutes talk, 5 minutes questions
  - Short papers: 10 minutes talk, 5 minutes questions
  - Challenge papers, 12 minutes
- Best paper presentation and best challenge presentation will receive a prize offered by the Datalift project
- Proceedings will be published on CEUR



# Session 1

- 9:00 AM - 10:30 AM - Morning Session 1
- Keynote address:
  - "Strategic opportunities through applying semantic technologies to modernising official statistics", by Dr. Siu-Ming Tam, Head of the Methodology and Data Management Division at the Australian Bureau of Statistics.
- Paper
  - "Australian Bureau of Statistics Implementation of Semantic Web Technology", by Michael Mechem, Arupa Sarkar and Peter Meadows (ABS)

# Session 2

- 10:30 AM - 12:00 noon - Morning session 2
- Four papers
  - "Towards the Discovery of Person-Level Data - Reuse of Vocabularies and Related Use Cases", by Thomas Bosch and Benjamin Zapilko, Joachim Wackerow (GESIS, Leibniz Institute for the Social Sciences), Arofan Gregory (Open Data Foundation)
  - "XKOS: Extending SKOS for Describing Statistical Classifications", by Dan Gillman (US-BLS), Franck Cotton (INSEE) and Yves Jaques (UN-FAO)

# Session 2 (cont.)

- "Towards Easy Matching Between Statistical Linked Data: Dimension Patterns", by Hideto Sato and Wen Wen (Tokyo International University)
- "Design and generation of Linked Clinical Data Cubes", by Laurent Lefort and Hugo Leroux (CSIRO)

# Session 3

- 1:45 PM - 3:30 PM - Afternoon session 1
- Four papers
  - "[Towards Linked Statistical Data Analysis](#)", by Sarven Capadisli (University of Leipzig), Sören Auer (University of Bonn), Reinhard Riedl (Bern University of Applied Sciences)
  - "[Discovering Related Data Sources in Data-Portals](#)", by Andreas Wagner and Achim Rettinger (Karlsruhe Institute of Technology), Peter Haase and Holger Lamm (fluid Operations)



# Session 3 (cont.)

- "OLAP Manipulations on RDF Data following a Constellation Model", by Rafik Saad, Olivier Teste, and Cássia Trojahn (IRIT & University of Toulouse)
- "Towards a Vocabulary for Incorporating Predictive Models into the Linked Data Web", by Evangelos Kalampokis, Areti Karamanou, Efthimios Tambouris and Konstantinos Tarabanis (University of Macedonia)

# Session 4

- 4:00 PM - 5:30 PM - Afternoon session 2
- Paper
  - "Detecting and Reporting Extensional Concept Drift in Statistical Linked Data", by Albert Meroño-Peñuela, Christophe Guéret, Rinke Hoekstra and Stefan Schlobach (Free University of Amsterdam, DANS and University of Amsterdam)

# Session 4 (cont.)

- Two challenge papers
  - "Analyzing Statistics with Background Knowledge from Linked Open Data", by Petar Ristoski and Heiko Paulheim (University of Mannheim)
  - "Non-Temporal Orderings as Proxies for Extensional Concept Drift", by Albert Meroño-Peñuela and Stefan Schlobach (Free University of Amsterdam and DANS)
- Best paper and best challenge paper awards
- Conclusions